

GREENLAND MULTI-COMMODITY PROJECT RETURNS MORE HIGH-GRADE REE RESULTS

Highlights

- **Up to 4.66% total rare earth oxide (TREO) in carbonatite samples from Grønnedal-Ika prospect at Eclipse's Greenland project**
 - New assay results further confirm the high-grade nature of this syenite-carbonatite complex with 4 out of 6 samples returning values greater 1.00% TREO
- New results are consistent with previously reported REE assays. **Highly anomalous multi-element assay results received from surface samples at Ivigtût and Grønnedal-Ika prospects, including:**
 - **165.00 g/t silver, 0.15% copper, 3.83% lead and 0.37% zinc** from Ivigtût mine dump grab sample I21009.
 - **0.32% lanthanum, 0.83% cerium, 0.12% praseodymium, 0.43% neodymium, 0.07% samarium, 0.05% gadolinium and 0.06% yttrium** in Grønnedal-Ika surface grab sample G21014.
 - **0.60% lanthanum, 1.7% cerium, 0.24% praseodymium, 0.82% neodymium, 0.16% samarium, 0.11% gadolinium and 0.011% yttrium** in Grønnedal-Ika surface grab sample G21016.
 - **0.27% lanthanum, 0.73% cerium, 0.10% praseodymium, 0.39% neodymium, 0.07% samarium, 0.05% gadolinium and 0.05% yttrium** in Grønnedal-Ika surface grab sample G21017.
 - **0.65% niobium, 34.00g/t silver, 0.96% lead, 0.15% copper, 0.16% tin, 200 ppm lithium and 4.40% fluorine** in Grønnedal-Ika surface grab sample of vein material G21011.
- **Assessment of exploration results to date indicates three distinct styles of REE mineralisation at the Ivigtût and Grønnedal-Ika prospects, ranging from light to heavy REE.**
- **Eclipse will use historic data to generate REE drill targets at Ivigtût and create a 3D model of historic electromagnetic and radiometric data over Grønnedal-Ika.**

Eclipse Metals Ltd (ASX: **EPM**) (**Eclipse Metals** or the **Company**) is pleased to provide the following update for its Ivigtût (also referred to as Ivittuut) rare earth element (REE), base metal and industrial mineral prospect, and Grønnedal-Ika REE prospect in southwestern Greenland.

Highly anomalous multi-element assay results

Eclipse has received final REE laboratory assay results for nine grab samples from Ivigtût and Grønnedal-Ika, collected during a helicopter-assisted reconnaissance program in late 2021. Preliminary results (ASX Announcement dated 9th March 2022) identified three possible magmatic hydrothermal events within the Company's project area. Many over-limit values returned from the first analytical run were further analysed by more accurate methods, which results are included in the table in **Annexure 1**. These results are applied to identifying the accurate ratio of the complete suite of REE to better identify the balance of Heavy Rare Earth (HREE) and Light Rare Earths (LREE) (**Table 1**).

Samples from Grønnedal-Ika and Ivigtût returned highly anomalous total rare earth oxide (TREO), with additional by-products of niobium (Nb) in Grønnedal-Ika, and lead (Pb), copper (Cu), zinc (Zn) and silver

(Ag) concentrations in Ivigtût (**Table 2**), further confirming the polymetallic nature of the Company's Greenland project.

Sample G21016 from Grønnedal-Ika returned a highly anomalous 4.66% TREO with 0.13% gadolinium oxide (Gd_2O_3), and by-product value of 3.3% barium oxide (BaO), whereas sample G21011 of a nearby aplitic vein is highly anomalous in niobium oxides with 0.93% Nb_2O_5 and elevated rubidium oxide, 0.07% Rb_2O and zircon oxide, 1.77% ZrO_2 . The ratio of elements in the suite of HREE and LREE results combined with the presence of other scarce metals in Grønnedal-Ika represents unique carbonatite REE mineralisation, requiring further assessment.

Table 1: Summary of total rare earth oxide (TREO) results in ppm showing heavy REE (HREE) and light REE (LREE).

SAMPLE	LREE							HREE								TREO
	Y2O3	La2O3	CeO2	Pr2O3	Nd2O3	Sm2O3	Eu2O3	Gd2O3	Tb2O3	Dy2O3	Ho2O3	Er2O3	Tm2O3	Yb2O3	Lu2O3	
ID	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm
I21007	46.73	17.71	49.26	4.17	9	3.19	0.12	3.62	1.28	9.95	2.36	8.04	1.38	8.6	1.14	167
I21009	0.51	0.23	0.61	0.09	0	0.06	0.02	0.06	0.02	0.13	0.03	0.1	0.02	0.16	0.02	2
I21012	8.51	2.11	6.51	0.85	3	1.44	0.06	1.36	0.45	3.51	0.7	2.08	0.29	1.78	0.2	33
G21010	406.4	1454	3575	443.5	1738	332.8	106.8	228.2	25.09	107.1	15.92	29.27	2.82	11.32	1.15	8477
G21011	1097	115.3	425	49.74	149	69.34	2.62	79.76	32	277.7	71.02	273.3	53.22	376.9	53.9	3126
G21014	715	3741	10220	1404	5039	850	259.4	538.3	58.7	233	30.58	48.37	3.93	14.97	1.69	23159
G21016	1365	7072	21374	2809	9553	1855	539.6	1268	122	470.6	58.88	89.88	6.7	21.81	2.27	46608
G21017	580.3	3167	8930	1143	4561	804.8	249	534.8	57.55	214.1	26.35	39.45	3.08	12.01	1.38	20324
G21019	530.8	2615	6437	896.5	3488	597.2	188.2	410.3	43.39	169.3	21.71	33.39	2.6	10.11	1.14	15444

Even though overall REE concentrations in random samples I21007, I21009 and I21012, collected from the Ivigtût mine dumps are relatively low with respect to TREO values, the ratio in the suite of elements with HREE in comparison to LREE is very encouraging and presents an unexpected style of mineralisation with Cu, Zn, Pb, and Ag in the historic pit environment.

Eclipse's bulk sampling was targeting industrial mineral and metals, however, the identification of scarce heavy REEs has cemented the conclusion of the uniqueness and polymetallic nature of the Ivigtût pit precinct (Table 2). These results highlight the potential for much of the mineralisation within the pit to have economic value, thus enhancing potential economics for re-development of this mine. Future exploration will include evaluation of the granite and greisen wall-rocks of the pit for REE potential.

More specifically, laboratory analyses of two fluorite samples (I21007 and I21009) and one cryolite-fluorite-siderite sample (I21012) collected from the historic Ivigtût mine dumps (Figure 1) returned:

- **22.20% fluorine, 8.60 g/t silver and 0.12% copper** in sample I21007, and
- **26.00% fluorine, 165.00 g/t silver, 0.14% copper, 3.83% lead and 0.37% zinc** in sample I21012.

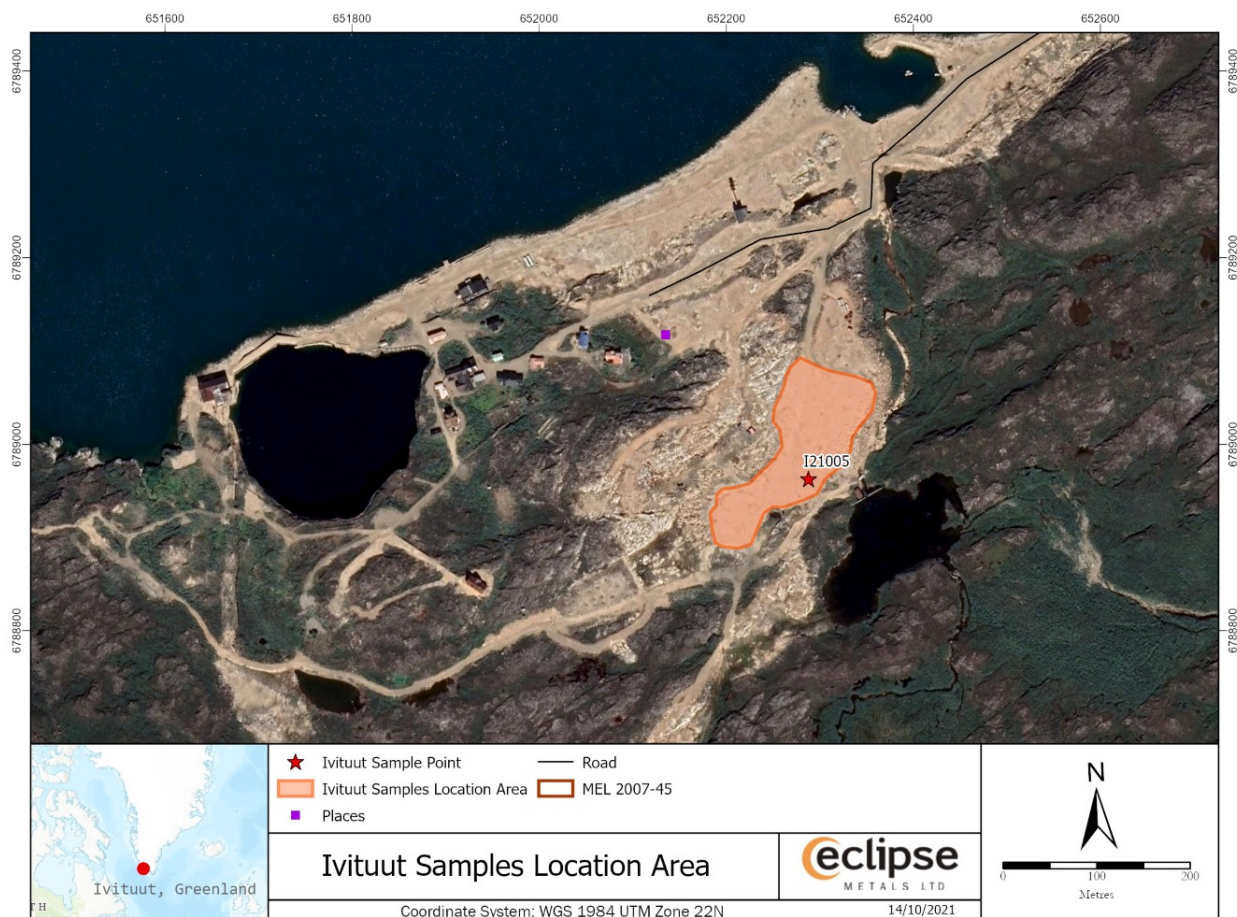


Figure 1. Image of the historic Ivigtût pit and waste dumps showing collection location for samples I21007, I21009 and I21012 (same location as I21005) .

Table 2: Summary of REE, precious, base and other metal assay results.

Ivigtût	TREO	Cu	Zn	Pb	Ag	Nb2O5	SrO
Sample Id	ppm	ppm	ppm	ppm	ppm	ppm	ppm
I21007	167	1160	89	84	8.6	82	2588
I21009	2	1375	3710	3.83%	165	1	331
I21012	33	485	1315	1195	7.8	4	1132

Grønnedal-Ika	TREO	Cu	Zn	Pb	Ag	Nb2O5	SrO
Sample Id	%	ppm	ppm	ppm	ppm	ppm	ppm
G21010	0.85	13	578	81	BD	31	5.13%
G21011	0.31	1500	409	0.96%	34	0.93%	1626
G21014	2.32	27	2480	134	<0.5	164	1910
G21016	4.66	5	1230	98	0.9	28	4075
G21017	2.03	26	1665	238	1.9	89	382
G21019	1.54	10	2350	52	0.5	29	1350

Note: Some assays converted from ppm to percentages.

Analysis of five ferro-carbonatite grab samples:- G21010 magnetite-limonite-bearing; G21014, G21016, G2107, and G21019, collected from the Grønnedal-Ika carbonatite complex (Figure 2) returned highly anomalous LREE and HREE assay values, as detailed in Table 1 above.

A sample from a sulphide-bearing aplite (G21011) that cuts the carbonatite rocks returned significant metals values, refer Table1.

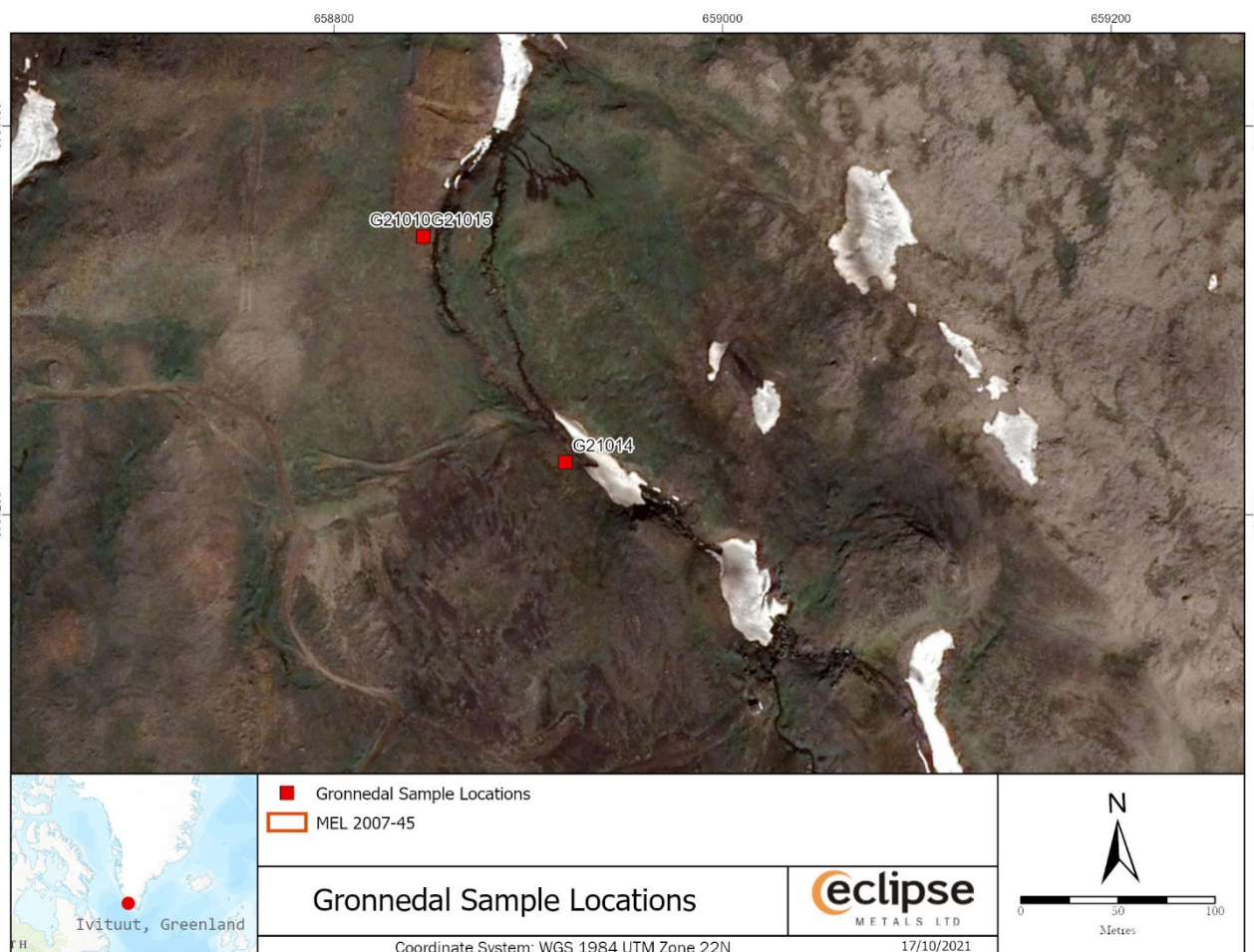


Figure 2. Grønnedal-Ika sample locations

Full assay results are provided in **Annexure 1**.

Eclipse Metals Executive Chairman Carl Popal said: “Our grab sampling program has once again verified the potential of both Ivigtût and Grønnedal-Ika to host REE mineralisation as well as precious, base and industrial metals, which is very encouraging, especially as the demand for REEs, in particular dysprosium, neodymium and praseodymium, as well as niobium continues to grow.

“We have many historical core samples from Ivigtût that need to be assayed for these elements as there had not been any REE exploration previously at the project, and this will provide us with a better understanding of what the existing pit holds, while we plan to create a 3D model for Grønnedal-Ika using the data we have at hand.

“I am planning a site visit to Greenland, and we are in the process to submit a work program to the Greenland Mineral Licence and Safety Authority (MLSA) for onsite work programs starting in the next few months as we work to progress our exploration and uncover the project’s full potential.”

Discussion of REE results

Laboratory assay results from surface grab and historic drill core samples collected by the Company to date (ASX release dated 15th November 2021) as well as supplementary readings obtained with a

handheld XRF analyser (ASX release dated 17th November 2021) indicate the presence of several distinct styles of REE mineralisation:

1. Carbonatite-hosted REE mineralisation

Grønnedal-Ika's Mesoproterozoic ($1,299 \pm 17$ Ma) carbonatite-syenite complex covers a surface area of 8km × 3km and, as such, is comparable in size to other REE-bearing carbonatites such as Mountain Pass (California), Mt Weld (Australia) and Steenkampskraal (South Africa).

Multiple significant REE results obtained by Eclipse Metals to date (see ASX announcement dated 2nd March 2021 and 15th November 2021) imply that Grønnedal-Ika has the potential to contain significant REE mineralisation. The presence of light REE mineralisation at Grønnedal-Ika is consistent with other REE-bearing carbonatite intrusive complexes.

Preliminary sampling by Eclipse Metals of historic drill core from Grønnedal-Ika returned significant TREO up to 22.70% in sample IVT 21-3 (see ASX announcement dated 15th November 2021). Laboratory results and complementary XRF readings suggest that, in addition to light REE mineralisation, the Grønnedal-Ika carbonatite-syenite complex is also – at least in part – enriched in **dysprosium (Dy)**, **praseodymium (Pr)** and **neodymium (Nd)**. The latter are often termed the 'magnet feed' rare earth elements which are critical for high-performance magnets used by the automotive sector and in wind turbines.



Figure 3. Grab sample G21016 from Grønnedal-Ika showing a yet to be positively identified pink mineral that is highly anomalous in REE.

2. Other styles of REE mineralisation

Additional REE targets requiring field examination include:

- (i) Certain aplite and pegmatite dykes at Grønnedal-Ika are characterised by a combination of highly anomalous heavy REE and other metals such as tin, niobium, and thorium as exemplified by sample G21011. Further work is required to determine the volume of these aplite and pegmatite dykes and their resource potential.
- (ii) Carbonatite and dolerite dykes at Ivigtût and Grønnedal-Ika are reported as having REE potential, which is yet to be tested.
- (iii) The greisen that encloses the Ivigtût cryolite deposit is known to be enriched in REE, tin, tantalum, niobium, and tungsten, however, previous operators focused only on cryolite. Further work, in particular drilling, is required to better define the economic potential of this rock unit.

Overall, the various styles of REE mineralisation at Grønnedal-Ika and Ivigtût, ranging from light to heavy REE, and their respective geological host environments are testament to a complex intrusive history and multiple episodes of REE enrichment. Previous operators focused only on delineating and mining the Ivigtût cryolite deposit and Eclipse Metals is the first company to test the REE and multi-element potential at both Grønnedal-Ika and Ivigtût.

The assays received by Eclipse Metals to date have provided significant additional information on the prospectivity of the historic Ivigtût mine precinct. For Ivigtût, the availability of an extensive library of historic drill core from this project area will save considerably on time and costs in providing a guide to future drilling to explore for REE and other types of mineralisation in this prospect.

Examination of samples and results from Grønnedal-Ika have confirmed a consistent spatial relationship between magnetically anomalous zones and REE mineralisation that will be applied as a guide for future exploration surveys and drilling. Given this spatial (and possibly genetic) relationship, the Company plans to create a three-dimensional (3D) geophysical inversion model of the historic electromagnetic and radiometric data over Grønnedal-Ika, which will serve as a critical tool for generating REE drill targets.

Authorised for release by the Board

Carl Popal
Executive Chairman

Oliver Kreuzer
Non-Executive Director



About Eclipse Metals Ltd (ASX: EPM)

Eclipse Metals Ltd is an Australian exploration company focused on exploring South-western Greenland, Northern Territory and Queensland for multi commodity mineralisation. Eclipse Metals Ltd has an impressive portfolio of assets prospective for cryolite, fluorite, siderite, quartz (high purity silica), REE, gold, platinum group metals, manganese, palladium, vanadium and uranium mineralisation. The Company's mission is to increase shareholders' wealth through capital growth and ultimately dividends. Eclipse Metals Ltd plans to achieve this goal by exploring for and developing viable mineral deposits to generate mining or joint venture incomes.

About the Ivigtût Project

Ivigtût is located in southwestern Greenland and has a power station and fuel supplies to service this station and local traffic to support mineral exploration. About 5.5km to the northeast of Ivigtût, the settlement of Kangilinnguit (aka Grønnedal), provides a heliport and an active wharf with infrastructure. The Grønnedal-Ika carbonatite complex is less than 10km from Ivigtût and only 5km from the port of Grønnedal. This complex is one of the 12 larger Gardar alkaline intrusions in Greenland and is recognised by GEUS as one of Greenland's prime REE targets along with Kvanefjeld and Kringlerne (Tanbreez).

The Gardar Province of southwest Greenland constitutes one of the best-endowed REE provinces worldwide. It represents an ancient continental rift zone that was active between 1,330 and 1,140 Ma (i.e., Mesoproterozoic era). Gardar magmatism produced a broad suite of extrusive and intrusive rocks, including kilometre-scale alkaline complexes that are among the world's largest alkaline ore deposits. The Ivittuut mineralised system, spatially and genetically associated with an evolved alkaline complex of the Gardar Province, formed 1.3 billion years ago as cooling hydrothermal fluids moved through the Earth's crust.

Competent Persons Statement

The information in this report / ASX release that relates to Exploration Results is based on information compiled and reviewed by Mr. Rodney Dale, Non-Executive Director of Eclipse Metals Ltd. Mr. Dale holds a Fellowship Diploma in Geology from RMIT, is a Fellow of the Australasian Institute of Mining and Metallurgy (FAusIMM) and has sufficient experience relevant to the styles of mineralisation under consideration and to the activity being reported to qualify as a Competent Person as defined in the 2012 Edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr Dale consents to the inclusion in this report / ASX release of the matters based on information in the form and context in which it appears. Additionally, Mr Dale confirms that the entity is not aware of any new information or data that materially affects the information contained in the ASX releases referred to in this report.

Assay Data, Ivigtût and Gronnedal (Analytical Method ME-MS81)

SAMPLE ID	Ba	Ce	Dy	Er	Eu	Ga	Gd	Hf	Ho	La	Lu	Nb	Nd	Pr	Rb	Sm	Sn	Sr	Ta	Tb	Th	Tm	U	V	W	Y	Yb	Zr
	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm
I21007	283	40.1	8.67	7.03	0.1	70.4	3.14	9.4	2.06	15.1	1	57.4	7.8	3.56	585	2.75	68	1210	6.3	1.11	44.4	1.21	5.04	10	5	36.8	7.55	224
I21009	7.9	0.5	0.11	0.09	<0.02	16.1	<0.05	<0.1	0.03	0.2	0.02	0.8	0.2	0.08	183	0.05	14	154.5	0.1	0.02	0.22	0.02	0.11	8	1	0.4	0.14	<2
I21012	147	5.3	3.06	1.82	0.05	22.8	1.18	0.1	0.61	1.8	0.18	2.8	2.3	0.73	162.5	1.24	12	529	0.7	0.39	6.41	0.25	0.59	63	3	6.7	1.56	2
G21010	9900	2910	93.3	25.6	92.2	14.3	198	0.1	13.9	1240	1.01	21.5	1490	379	10	287	1	24000	0.3	21.8	226	2.47	1.31	23	<1	320	9.94	3
G21011	125	346	242	239	2.26	87	69.2	931	62	98.3	47.4	6500	127.5	42.5	631	59.8	1630	760	654	27.8	4420	46.6	248	6	144	864	331	17700
G21014	6150	8320	203	42.3	224	38.4	467	2.7	26.7	3190	1.49	114.5	4320	1200	16.7	733	9	893	3.6	51	585	3.44	26.5	61	2	563	13.15	102
G21016	29700	17400	410	78.6	466	64.1	1100	1.3	51.4	6030	2	19.7	8190	2400	3	1600	3	1905	0.6	106	809	5.87	25.3	283	1	1075	19.15	73
G21017	5320	7270	186.5	34.5	215	31.5	464	5.4	23	2700	1.21	62.5	3910	977	7	694	15	178.5	4.9	50	420	2.7	30.9	121	2	457	10.55	153
G21019	2910	5240	147.5	29.2	162.5	25	356	0.5	18.95	2230	1	20.1	2990	766	6.2	515	1	631	0.4	37.7	344	2.28	26.7	94	1	418	8.88	31

Assay Results – Cu, Zn, Pb, Ag (Analytical Method ME – ICP61)

SAMPLE ID	Cu	Zn	Pb	Ag
	ppm	ppm	ppm	ppm
I21007	1160	89	84	8.6
I21009	1375	3710	3.83%	165
I21012	485	1315	1195	7.8
G21010	13	578	81	<0.5
G21011	1500	409	9600	34
G21014	27	2480	134	<0.5
G21016	5	1230	98	0.9
G21017	26	1665	238	1.9
G21019	10	2350	52	0.5

Assay Results – F (Analytical Method F-ELE81a)

SAMPLE ID	F
	ppm
I21007	22.20%
I21009	26%
I21012	19.90%
G21010	4530
G21011	4.40%
G21014	8870
G21016	3160
G21017	2420
G21019	2620

JORC Code, 2012 Edition – Table 1

Section 1 Sampling Techniques and Data

(Criteria in this section apply to all succeeding sections.)

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> <i>Nature and quality of sampling (eg cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling.</i> <i>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</i> <i>Aspects of the determination of mineralisation that are Material to the Public Report.</i> <i>In cases where 'industry standard' work has been done this would be relatively simple (eg 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information.</i> 	<ul style="list-style-type: none"> Random chips from outcrops and mullock dumps. Samples from Ivigtût mine dumps intended to represent major rock types; qualitative only. Grønnedal-Ika carbonatite samples represent outcropping rock formations; qualitative only. Initial field tests by hand-held XRF assumed to be indicative only. Instrument not calibrated. Chemical analyses to assess levels of elements contained, not for ore-grade estimates.
Drilling techniques	<ul style="list-style-type: none"> <i>Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).</i> 	<ul style="list-style-type: none"> No drilling was undertaken as part of the grab sampling program.
Drill sample recovery	<ul style="list-style-type: none"> <i>Method of recording and assessing core and chip sample recoveries and results assessed.</i> <i>Measures taken to maximise sample recovery and ensure representative nature of the samples.</i> <i>Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.</i> 	<ul style="list-style-type: none"> No drilling was undertaken as part of the grab sampling program.
Logging	<ul style="list-style-type: none"> <i>Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.</i> <i>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</i> <i>The total length and percentage of the relevant intersections logged.</i> 	<ul style="list-style-type: none"> Samples geologically logged before submission for analysis for identification only. Not quantitative.
Sub-sampling	<ul style="list-style-type: none"> <i>If core, whether cut or sawn and whether quarter, half or all core taken.</i> 	<ul style="list-style-type: none"> Samples for geological determination and identification only. Not quantitative.

Criteria	JORC Code explanation	Commentary
<i>techniques and sample preparation</i>	<ul style="list-style-type: none"> <i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i> <i>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</i> <i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i> <i>Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.</i> <i>Whether sample sizes are appropriate to the grain size of the material being sampled.</i> 	<ul style="list-style-type: none"> No duplicates collected or determined.
<i>Quality of assay data and laboratory tests</i>	<ul style="list-style-type: none"> <i>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</i> <i>For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.</i> <i>Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.</i> 	<ul style="list-style-type: none"> Standard laboratory procedures for sample preparation, elemental determination, QA / QC. XRF instrument used only to select mineralized samples for shipment to reduce quantity and weight of samples sent from Greenland to Australia. Standard laboratory procedures with blanks and duplicates. No external laboratory checks warranted at this stage.
<i>Verification of sampling and assaying</i>	<ul style="list-style-type: none"> <i>The verification of significant intersections by either independent or alternative company personnel.</i> <i>The use of twinned holes.</i> <i>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</i> <i>Discuss any adjustment to assay data.</i> 	<ul style="list-style-type: none"> No drilling was undertaken as part of the grab sampling program.
<i>Location of data points</i>	<ul style="list-style-type: none"> <i>Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</i> <i>Specification of the grid system used.</i> <i>Quality and adequacy of topographic control.</i> 	<ul style="list-style-type: none"> Handheld GPS locations:- Ivigtût – within 100m of 652288mE : 6788960mN Grønnedal-Ika – within 100m of 658880mE : 6791300mN. No grid. Handheld GPS only and correlation with hard-copy maps.
<i>Data spacing and distribution</i>	<ul style="list-style-type: none"> <i>Data spacing for reporting of Exploration Results.</i> <i>Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied.</i> <i>Whether sample compositing has been applied.</i> 	<ul style="list-style-type: none"> Grab samples were collected at random sites, determined by outcrop availability and safe access to the Ivigtût mine dumps. No assumption of continuity or resource estimation. Samples not composited.
<i>Orientation of data in relation to</i>	<ul style="list-style-type: none"> <i>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is</i> 	<ul style="list-style-type: none"> Rock chips were collected at random and based on rock type, not structure. No drilling was undertaken as part of the

Criteria	JORC Code explanation	Commentary
<i>geological structure</i>	<p><i>known, considering the deposit type.</i></p> <ul style="list-style-type: none"> <i>If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material.</i> 	grab sampling program.
<i>Sample security</i>	<ul style="list-style-type: none"> <i>The measures taken to ensure sample security.</i> 	<ul style="list-style-type: none"> Samples secured on-site and transported by airline to Australia under normal security procedures.
<i>Audits or reviews</i>	<ul style="list-style-type: none"> <i>The results of any audits or reviews of sampling techniques and data.</i> 	<ul style="list-style-type: none"> No audits have been completed yet.

Section 2 Reporting of Exploration Results

(Criteria listed in the preceding section also apply to this section.)

Criteria	JORC Code explanation	Commentary
<i>Mineral tenement and land tenure status</i>	<ul style="list-style-type: none"> <i>Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.</i> <i>The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.</i> 	<ul style="list-style-type: none"> MEL 2007 / 45 granted to Eclipse Metals in February 2021 for a period of 3 years with extensions subject to activities and expenditure. Granted by Government of Greenland.
<i>Exploration done by other parties</i>	<ul style="list-style-type: none"> <i>Acknowledgment and appraisal of exploration by other parties.</i> 	<p>GEUS Report File No. 20236 The Planning of the Ivigtût Open Pit of Kryolitselskabet Oresund A/S - Mining of the Fluoritic Orebody"; Outokompu OY Mining Consultants, 1987. This report provided 18 cross sections showing drill traces with cryolite (kry), fluorite (fs) and siderite (sid) values together with pit profiles, resource blocks and tabulated tonnage estimates on each section with an SG of 2.95.</p> <p>GEUS Report File No. 20238 "The Planning of the Ivigtût Open Pit of Kryolitselskabet Oresund A/S – Report of the First Phase, Investigation of the Quantity and Quality of Extractable Ore from the Ivigtût Open Pit"; Outokompu OY Mining Consultants, 1986. This report contained 23 sections showing drillhole traces and contoured cryolite/fluorite grades with an overlay of resource blocks. These sections were used to check positions of drillholes relative to those shown in the above report (GEUS 20236). Resource tonnages are provided.</p> <p>GEUS Report File No. 20335 Kryolitselskabet Oresund A/S, De Resterende Mineralreserver I Kryolitforekomsten Ved Ivigtût, Ultimo 1987" This report is the most useful of the reports. It provides: - Drillhole location plan - Complete cross section locations - Pit survey points - Plans of</p>

Criteria	JORC Code explanation	Commentary
		<p>underground and in-pit ramp - 38 cross section showing drillhole traces, geological interpretation and ore blocks - Tabulated ore blocks with cryolite, fluorite and siderite grades and tonnages (back-calculated blanket SG of 3)</p> <p>GEUS Report File No. 21549 "Ivigtût Mineopmaaling, 1962" This report is a survey record of the open pit and includes 28 sections, each of which show the pit profile together with drillhole traces and, on some sections, underground workings.</p> <p>GEUS Report File No. 20241 Kryolitselskabet Oresund A/S, Lodighedsdistribution I, Ivigtût Kryolitbrud, 31.12.1985" (Danish) 108 pages of drillhole analytical data in %: hole ID, from to, cryolite, fluorspar, Fe, Cu, Zn, Pb, S</p> <p>Pauly, H. (1986) Cryolithionite and Li in the cryolite deposit Ivigtût, South Greenland. The Royal Danish Academy of Sciences and Letters, Matematisk-fysiske Meddelelser, 42(1), 24 p.</p>
Geology	<ul style="list-style-type: none"> • <i>Deposit type, geological setting and style of mineralisation.</i> 	<ul style="list-style-type: none"> • Late stage granitic / syenitic / carbonatite intrusions into crystalline basement.
Drill hole Information	<ul style="list-style-type: none"> • <i>A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:</i> <ul style="list-style-type: none"> ○ <i>easting and northing of the drill hole collar</i> ○ <i>elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</i> ○ <i>dip and azimuth of the hole</i> ○ <i>down hole length and interception depth</i> ○ <i>hole length.</i> • <i>If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case.</i> 	<ul style="list-style-type: none"> • No drilling was undertaken as part of the grab sampling program.
Data aggregation methods	<ul style="list-style-type: none"> • <i>In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated.</i> • <i>Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail.</i> 	<ul style="list-style-type: none"> • No drilling was undertaken as part of the grab sampling program.

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> The assumptions used for any reporting of metal equivalent values should be clearly stated. 	
<i>Relationship between mineralisation widths and intercept lengths</i>	<ul style="list-style-type: none"> These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known'). 	<ul style="list-style-type: none"> No drilling was undertaken as part of the grab sampling program.
<i>Diagrams</i>	<ul style="list-style-type: none"> Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported. These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views. 	<ul style="list-style-type: none"> Appropriate maps are provided in the body of the text.
<i>Balanced reporting</i>	<ul style="list-style-type: none"> Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	<ul style="list-style-type: none"> All assay results for the rock chip sampling have been reported in the Table 1 in the body of text.
<i>Other substantive exploration data</i>	<ul style="list-style-type: none"> Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances. 	<ul style="list-style-type: none"> The exploration by Eclipse Metals of the Ivigtût and Grønnedal-Ika prospects is at an early stage with field work to date mostly limited to reconnaissance sampling. The Company expects to be able to report substantive exploration data once it has completed it's first full field season at the prospects.
<i>Further work</i>	<ul style="list-style-type: none"> The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	<ul style="list-style-type: none"> Geological mapping; remote sensing; drilling. Detailed geological assessments planned for 2022 field season.